

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims

1. (Currently Amended) A process for manufacturing a printed wiring board, which process comprises preparing a laminated film comprising ~~an insulating film~~ a polyimide film and a ~~conductive metal~~ copper layer provided on at least one surface of the ~~insulating~~ polyimide film with a sputtered metal layer formed from nickel, chrome or an alloy thereof in between, selectively etching the ~~conductive metal~~ copper layer and the sputtered metal layer of the laminated film to produce a wiring pattern, treating the laminated film with a first treatment liquid capable of dissolving nickel of the sputtered metal layer, and treating with a second treatment liquid capable of dissolving chrome of the sputtered metal layer and also capable of eliminating the sputtered metal layer in the ~~insulating~~ polyimide film to remove a superficial surface of the insulating film exposed from the wiring pattern together with the residual sputtered metals in the superficial surface.

2. (Cancelled)

3. (Cancelled)

4. (Original) The process according to claim 1, wherein a surface of the insulating film, which comprises a polyimide film, exposed from the wiring pattern is removed to a depth of 1 to 100 nm with use of the second treatment liquid.

5. (Cancelled)

6. (Cancelled)

7. (Original) The process according to claim 1, wherein the process further comprises plating the wiring pattern.

8. (Original) The process according to claim 7, wherein the plating is selective plating of the conductive metal layer that forms the wiring pattern.

9. (Withdrawn). A printed wiring board comprising an insulating film and a wiring pattern formed on at least one surface of the insulating film, wherein the insulating film in an area exposed from the wiring pattern has a thickness that is smaller by 1 to 100 nm than that of an area under the wiring pattern.

10. (Withdrawn). The printed wiring board according to claim 9, wherein the insulating film is a polyimide film.

11. (Withdrawn). The printed wiring board according to claim 9, wherein the wiring pattern is formed directly on the insulating film without any intermediate adhesive layer.

12. (Withdrawn). The printed wiring board according to claim 9, wherein the wiring pattern comprises a laminate of metal layers including a sputtered metal layer directly on the insulating film that comprises Ni and/or Cr, and a conductive metal layer on the sputtered metal layer that comprises a conductive metal other than Ni and Cr.

13. (Withdrawn). The printed wiring board according to claim 9, wherein the conductive metal layer that forms the wiring pattern is selectively plated.

14. (Withdrawn). A circuit device comprising an electronic component mounted on the printed wiring board of claim 9.

15. (New) The process according to claim 1, wherein the laminated film is treated with the first treatment liquid including mixtures of approximately 5 to 15 % by weight each of sulfuric acid and hydrochloric acid at temperatures of 30 to 55° C over a period of 2 to 40 seconds and further treated with the second treatment liquid including aqueous potassium permanganate/KOH solution having the potassium permanganate concentration of 10 to 60 g/l at temperatures of 40 to 70° C over a period of 10 to 60 seconds.